REMARKS

Claims 4-5, 9-11, 28 and 31-34 are pending in this application. By this Amendment, claims 4, 10 and 28 are amended and claims 13, 29-30 and 35 are canceled without prejudice or disclaimer.

Entry of the amendments is proper under 37 C.F.R. §1.116 because the amendments: (1) place the application in condition for allowance; (2) do not raise any new issues requiring further search and/or consideration; (3) satisfy a requirement of form asserted in the previous Office Action; and/or (4) place the application in better form for appeal, should an appeal be necessary. More specifically, the amendments to independent claim 1 and 28 include features from previously-recited dependent claims 13, 19-30 and 35. Dependent claim 10 is also amended for clarity. Thus, no new issues are raised by this Amendment. Entry is thus proper under 37 C.F.R. §1.116.

The Office Action rejects claim 10 under 35 U.S.C. §112, second paragraph. It is respectfully submitted that the above amendment to claim 10 obviates the grounds for rejection. Withdrawal of the rejection is respectfully requested.

The Office Action rejects claims 4-5 and 9-14 under 35 U.S.C. §102(e) by U.S. Patent 6,496,194 to Mikoshiba et al (hereafter Mikoshiba). The Office Action does not specifically state that claims 28-35 are rejected. However, since claims 28-35 are addressed in the text of the Office Action, applicant will also specifically address these claims. The rejection is respectfully traversed.

Independent claim 4 recites extracting a motion information from the first video data and the second video data including the detected false contour generation regions; and compensating a false contour by using the extracted motion information. Independent claim 4 also recites that the compensating comprises setting a compensation value based on a velocity value from the motion information, adding or subtracting the compensation value to or from a gray scale that has generated the false contour depending on a direction from the motion information, and setting the compensation value based on a size of the gray scale, wherein the gray scale to or from which the compensation value is added or subtracted is any one of adjacent gray scales that generate a false contour generation region.

Mikoshiba does not teach or suggest at least these features of independent claim 4. More specifically, Mikoshiba teaches comparing luminance levels of pixels between two successive frames and by superimposing a weighted equalizing pulse on any pixel whose bit state has changed. See Mikoshiba's col. 15, lines 60–67, which is cited in the Office Action. This does not teach or suggest detecting each false contour generation regions from first video data for a previous frame period and second video data for a current frame period in combination with extracting a motion information from the first video data and the second video data including the detected false contour generation regions, as recited in independent claim 4. Further, Mikoshiba does not teach or suggest adding or subtracting a compensation value to or from a gray scale where the gray scale to or from which the compensation value is added or subtracted

to any one of adjacent gray scales that generate false contour generation region, as recited in independent claim 4.

Mikoshiba teaches that a comparator 410a compares bit data in the n-th frame with bit data in the (n+1)th frame, and outputs "+1" for any bit in the bit data that changed from ON to OFF, outputs "-1" for any bit that changed from OFF to ON, and output "0" for any bit that did not change state between the frames. See Mikoshiba's col. 12, lines 45–55, which is cited in the Office Action.

Mikoshiba also teaches alleviating problems of moving-image false contours in video for moving images moving at various speeds and in various direction, such as fast-moving images moving at a speed. See Mikoshiba's col. 16, lines 50–55, col. 36, lines 45–50. Mikoshiba also teaches a motion compensation equalizing pulse insertion process. See Mikoshiba's col. 23, lines 8–15.

However, Mikoshiba does not teach or suggest adding or subtracting the compensation value to or from a gray scale that has generated the false contour depending on a direction from the motion information, and setting the compensation value based on a size of the gray scale, wherein the gray scale to or from which the compensation value is added or subtracted is any one of adjacent gray scales that generate false contour generation region. Thus, independent claim 4 defines patentable subject matter.

Independent claim 28 recites compensating a false contour by adjusting a gray scale based on the determined motion information, wherein the compensating includes adding or

subtracting a compensation value to or from the gray scale depending on a direction of the motion information, setting the compensating value based on a velocity value of the motion information, and setting the compensation value based on a size of the gray scale, wherein the gray scale to or from which the compensation value is added or subtracted is any one of adjacent gray scales that generate a false contour generation region. For at least similar reasons as set forth above, Mikoshiba does not teach or suggest at least these features of independent claim 28. Further, Mikoshiba also does not teach or suggest determining motion information from the first video data and the second video data including the determined false contour generation regions. Accordingly, independent claim 28 defines patentable subject matter.

For at least the reasons set forth above, each of independent claims 4 and 28 defines patentable subject matter. Each of the dependent claims depends from one of the independent claims and therefore defines patentable subject matter at least for this reason. In addition, the dependent claims recite features that further and independently distinguish over the applied references.

CONCLUSION

In view of the foregoing, it is respectfully submitted that the application is in condition for allowance. Favorable consideration and prompt allowance of claims 4-5, 9-11, 28 and 31-34 are earnestly solicited. If the Examiner believes that any additional changes would place the application in better condition for allowance, the Examiner is invited to contact the undersigned attorney at the telephone number listed below.

To the extent necessary, a petition for an extension of time under 37 C.F.R. 1.136 is hereby made. Please charge any shortage in fees due in connection with the filing of this, concurrent and future replies, including extension of time fees, to Deposit Account 16-0607 and please credit any excess fees to such deposit account.

Respectfully submitted,
FLESHNER & KIM, LLP

David C. Oren
Registration No. 38,694

P.O. Box 221200
Chantilly, Virginia 20153-1200
(703) 766-3701 DYK:DCO/kah
Date: July 28, 2006
Please direct all correspondence to Customer Number 34610